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TECHNOLOGY CENTER R3700

8272283 94338344 PMID: 8060309

Membrane bound **CETP** mediates the transfer of free cholesterol between lipoproteins and membranes.

Ruiz-Noriega M; Silva-Cardenas I; Delgado-Coello B; Zentella-Dehesa A; Mas-Oliva J

Instituto de Fisiologia Celular, UNAM, Mexico.

Biochemical and biophysical research communications (UNITED STATES) Aug 15 1994, 202 (3) p1322-8, ISSN 0006-291X Journal Code: 0372516

Document type: Journal Article

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

Cholesteryl ester transfer protein (**CETP**) has been shown to transfer cholesteryl esters among plasma lipoproteins. However, when reconstituted into phosphatidylcholine liposomes, the 74,000 protein mediates above non-specific values the transfer of HDL bound [3H]cholesterol into the artificial membrane system. Employing the known **cDNA sequence** of **CETP**, we synthesized a series of oligonucleotides with specific sequences for different regions of **CETP** and RNA isolated from tissues known to be producers of **CETP** (liver), and tissues not design to synthesize and secrete **CETP** (ovary, lung, intestine and heart). Hybridization experiments showed that independently of the type of tissue tested **CETP** sequences were found. It is suggested that a membrane form of **CETP** might have important repercussions locally.

Membrane bound **CETP** mediates the transfer of free cholesterol between lipoproteins and membranes.

Aug 15 1994,

Cholesteryl ester transfer protein (**CETP**) has been shown to transfer cholesteryl esters among plasma lipoproteins. However, when reconstituted into phosphatidylcholine...

30/3,K,AB/4 (Item 4 from file: 155)
DIALOG(R) File 155:MEDLINE(R)
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06199990 89215620 PMID: 3244015

Cloning and mRNA tissue distribution of **rabbit** cholesteryl ester transfer protein.

Nagashima M; McLean J W; Lawn R M

Department of Cardiovascular Research, Genentech, Inc., South San Francisco, CA 94080.

Journal of lipid research (UNITED STATES) Dec 1988, 29 (12)

p1643-9, ISSN 0022-2275 Journal Code: 0376606

Document type: Journal Article

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

The amino acid **sequence** of **rabbit** cholesteryl ester transfer protein (**CETP**) has been obtained from cloned **cDNA** and genomic **sequences**. The 496 amino acid **rabbit CETP** has an overall **sequence** homology of 81% compared to the 476 amino acid human **CETP**, with two-thirds of the amino acid substitutions being conservative. Like human **CETP**, **rabbit CETP** is extremely hydrophobic, which is consistent with its function in the transfer of neutral lipids. The data implies extensive structural similarity between **rabbit** and human **CETP**. **Rabbit CETP** mRNA is estimated to be 2.2 kilobases in size, 300 nucleotides longer than the corresponding human mRNA, and contains the unusual polyadenylation signal **sequence** AGTAAA. In **rabbit**, **CETP** mRNA is found mainly in the liver, with small amounts also present in adrenal glands and kidney. In contrast to human spleen, **rabbit** spleen does not have detectable amounts of **CETP** mRNA. Northern blot analysis of liver poly(A)⁺ RNAs revealed significant amounts of **CETP** message in human, rhesus, and **rabbit**, and undetectable levels in pig, mouse, and rat, in agreement with reported plasma levels of transfer activity.

? ds

Set	Items	Description
S1	0	TETANUS (5N) TOXOID (5N) CDNA
S2	14825	TETANUS (5N) (TOXIN OR TOXOID)
S3	347525	CDNA
S4	96	S2 AND S3
S5	63	S4 AND PY<1996
S6	50	RD (unique items)
S7	129	TETANUS (5N) (CDNA OR GENE)
S8	80	RD (unique items)
S9	33	S8 AND PY<1996
S10	1839226	SEQUENC?
S11	24	S9 AND S10
S12	2872	CMV (5N) PROMOTER
S13	157100	PLASMID
S14	685	S12 AND S13
S15	52	S14 AND PY<1996
S16	23	RD (unique items)

? s rabbit(5n) CETP

377444 RABBIT

2579 CETP

S17 73 RABBIT(5N) CETP

? s cdna or gene

<-----User Break----->

u!

? s cetp

S18 2579 CETP

? s rabbit??

S19 593032 RABBIT??

? s s18 and s19

2579 S18

593032 S19

S20 246 S18 AND S19

? s (cdna or gene) (5n)sequence

347525 CDNA

2197573 GENE

1521657 SEQUENCE

S21 225755 (CDNA OR GENE) (5N)SEQUENCE

? s s20 and s21

246 S20

225755 S21

S22 13 S20 AND S21

? rd

>>>Duplicate detection is not supported for File 340.

>>>Records from unsupported files will be retained in the RD set.

...completed examining records

S23 10 RD (unique items)

? s s23 and py<1996

Processing

10 S23

27414523 PY<1996

S24 5 S23 AND PY<1996

? t s24/3,k,ab/1-5

24/3,K,AB/1 (Item 1 from file: 155)

DIALOG(R) File 155:MEDLINE(R)

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08272283 94338344 PMID: 8060309

Membrane bound **CETP** mediates the transfer of free cholesterol between lipoproteins and membranes.

Ruiz-Noriega M; Silva-Cardenas I; Delgado-Coello B; Zentella-Dehesa A;

Mas-Oliva J

Instituto de Fisiologia Celular, UNAM, Mexico.

Biochemical and biophysical research communications (UNITED STATES) Aug
15 1994, 202 (3) p1322-8, ISSN 0006-291X Journal Code: 0372516

Document type: Journal Article

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Membrane bound CETP mediates the transfer of free cholesterol between lipoproteins and membranes.

Aug 15 1994,

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...; Sequence; Biological Transport; Carrier Proteins--genetics--GE; Molecular Sequence Data; Oligodeoxyribonucleotides; RNA, Messenger --metabolism--ME; Rabbits; Tissue Distribution

24/3,K,AB/2 (Item 2 from file: 155)

DIALOG(R) File 155:MEDLINE(R)

(c) format only 2003 The Dialog Corp. All rts. reserv.

06913966 91154277 PMID: 1999438

Mammalian adipose tissue and muscle are major sources of lipid transfer protein mRNA.

Jiang X C; Moulin P; Quinet E; Goldberg I J; Yacoub L K; Agellon L B; Compton D; Schnitzer-Polokoff R; Tall A R

Department of Medicine, Columbia University, New York, New York 10032.

Journal of biological chemistry (UNITED STATES) Mar 5 1991, 266

(7) p4631-9, ISSN 0021-9258 Journal Code: 2985121R

Contract/Grant No.: HL 21006; HL; NHLBI; HL 43165; HL; NHLBI; HL22682; HL ; NHLBI

Document type: Journal Article

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

The plasma cholesteryl ester transfer protein (CETP) catalyzes the transfer of cholesteryl esters from high density lipoproteins (HDL) to triglyceride-rich lipoproteins and plays a major role in the catabolism of

HDL. Lipoprotein lipase (LPL) is the rate-limiting enzyme for hydrolysis of circulating triglyceride and is involved in HDL formation. We show that tissues containing LPL are major sources of **CETP** mRNA in several mammalian species, including some with low cholesteryl ester transfer activity in plasma. In hamsters, adipose tissue and heart were found to be the richest sources of both **CETP** and LPL mRNA; in situ hybridization studies showed that the same cell types (i.e. adipocytes or myocytes) contained **CETP** and LPL mRNA in these tissues. Isolated adipocytes synthesized active **CETP**. Dietary studies revealed a complex pattern of response of **CETP** mRNA levels in different tissues, which showed partial similarity to the changes in LPL mRNA abundance. However, high cholesterol diets resulted in increased **CETP** mRNA abundance in adipose tissue, heart, and skeletal muscle, without equivalent changes in LPL mRNA. Plasma HDL cholesteryl ester levels showed strong inverse correlations with **CETP** mRNA abundance in adipose tissue. The results suggest a conserved function of **CETP** in adipose tissue and heart, such as a co-ordinate action with LPL to enhance HDL turnover. Although there is considerable overlap in the tissue- and cell-specific pattern of **CETP** and LPL gene expression, dietary studies revealed only limited parallelism in response at the mRNA level. The increase in **CETP** mRNA in peripheral tissues in response to increased dietary cholesterol suggests that local induction of **CETP** synthesis may help to recycle cholesterol deposited in these tissues during lipolysis of dietary lipoproteins.

Mar 5 1991,

The plasma cholesteryl ester transfer protein (**CETP**) catalyzes the transfer of cholesteryl esters from high density lipoproteins (HDL) to triglyceride-rich lipoproteins...

... is involved in HDL formation. We show that tissues containing LPL are major sources of **CETP** mRNA in several mammalian species, including some with low cholesteryl ester transfer activity in plasma. In hamsters, adipose tissue and heart were found to be the richest sources of both **CETP** and LPL mRNA; in situ hybridization studies showed that the same cell types (i.e. adipocytes or myocytes) contained **CETP** and LPL mRNA in these tissues. Isolated adipocytes synthesized active **CETP**. Dietary studies revealed a complex pattern of response of **CETP** mRNA levels in different tissues, which showed partial similarity to the changes in LPL mRNA abundance. However, high cholesterol diets resulted in increased **CETP** mRNA abundance in adipose tissue, heart, and skeletal muscle, without equivalent changes in LPL mRNA. Plasma HDL cholesteryl ester levels showed strong inverse correlations with **CETP** mRNA abundance in adipose tissue. The results suggest a conserved function of **CETP** in adipose tissue and heart, such as a co-ordinate action with LPL to enhance HDL turnover. Although there is considerable overlap in the tissue- and cell-specific pattern of **CETP** and LPL gene expression, dietary studies revealed only limited parallelism in response at the mRNA level. The increase in **CETP** mRNA in peripheral tissues in response to increased dietary cholesterol suggests that local induction of **CETP** synthesis may help to recycle cholesterol deposited in these tissues during lipolysis of dietary lipoproteins.

; Amino Acid Sequence; Base Sequence; Blotting, Southern; Cloning, Molecular; Diet; Gene Expression; Hamsters; Lipoprotein Lipase --genetics--GE; Molecular Sequence Data; Nucleic Acid Hybridization; RNA, Messenger--genetics--GE; Rabbits; Rats; Tissue Distribution

Gene Symbol: **CETP**

24/3,K,AB/3 (Item 1 from file: 34)
 DIALOG(R)File 34:SciSearch(R) Cited Ref Sci
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01925091 Genuine Article#: JM223 Number of References: 20

Title: IDENTIFICATION OF A SEQUENCE WITHIN THE C-TERMINAL-26 AMINO-ACIDS OF
CHOLESTERYL ESTER TRANSFER PROTEIN RESPONSIBLE FOR BINDING A
NEUTRALIZING MONOCLONAL-ANTIBODY AND NECESSARY FOR NEUTRAL LIPID
TRANSFER ACTIVITY (Abstract Available)

Author(s): WANG S; DENG LP; MILNE RW; TALL AR

Corporate Source: COLUMBIA UNIV COLL PHYS & SURG, DEPT MED, DIV MOLEC MED, 630
W 168TH ST/NEW YORK//NY/10032; COLUMBIA UNIV COLL PHYS & SURG, DEPT
MED, DIV MOLEC MED, 630 W 168TH ST/NEW YORK//NY/10032; CLIN RES INST
MONTREAL/MONTREAL H2W 1R7/QUEBEC/CANADA/

Journal: JOURNAL OF BIOLOGICAL CHEMISTRY, 1992, V267, N25 (SEP 5), P
17487-17490

ISSN: 0021-9258

Language: ENGLISH Document Type: NOTE

Abstract: The cholesteryl ester transfer protein (CETP; 476 amino acids) mediates the transfer of neutral lipids and phospholipids between plasma lipoproteins. Previous studies showed that the epitope of a neutralizing monoclonal antibody (TP2) was located within the C-terminal 26 amino acids (aa) of CETP. To determine possible involvement of this region in lipid transfer activities, we generated six deletion mutants between Arg-451 and Leu-475 by in vitro mutagenesis and expressed mutant proteins in mammalian cells. Only deletion mutants between aa Phe-463 and Leu-475 failed to bind TP2; these mutant proteins were well secreted by cells but showed markedly reduced cholesteryl ester transfer activity. One of the deletion mutants (DELTA-470-475) showed similar reductions in cholesteryl ester and triglyceride transfer activities but normal or increased phospholipid transfer activity. Limited proteolysis of this mutant protein indicated a similar overall folding pattern to the wild-type protein. Thus, aa between Phe-463 and Leu-475 are necessary for binding TP2. Deletions within this sequence selectively impair neutral lipid transfer activity, suggesting a direct involvement in neutral lipid transfer.

, 1992

Abstract: The cholesteryl ester transfer protein (CETP; 476 amino acids) mediates the transfer of neutral lipids and phospholipids between plasma lipoproteins. Previous...

...neutralizing monoclonal antibody (TP2) was located within the C-terminal 26 amino acids (aa) of CETP. To determine possible involvement of this region in lipid transfer activities, we generated six deletion...

Research Fronts: 90-0949 001 (RAT GENE ENCODING CHOLESTEROL
7-ALPHA-HYDROXYLASE; EXPRESSION SYSTEM; RABBIT SKELETAL-MUSCLE
MYOSIN LIGHT CHAIN KINASE; COS CELLS; LH RECEPTORS)
90-2362 001 (STA58 MAJOR...

...SHOCK PROTEIN HSP70 FAMILY)

90-8308 001 (AUTOPHOSPHORYLATED VIRA PROTEIN; SITE-DIRECTED
MUTAGENESIS; VARIANT BINDING SEQUENCE; ESCHERICHIA-COLI K-12
GENE AROG)

24/3,K,AB/4 (Item 2 from file: 34)
DIALOG(R)File 34:SciSearch(R) Cited Ref Sci
(c) 2003 Inst for Sci Info. All rts. reserv.

01378673 Genuine Article#: GU471 Number of References: 35
Title: THE REGULATION OF HEPATIC LIPASE AND CHOLESTERYL ESTER TRANSFER
PROTEIN-ACTIVITY IN THE CHOLESTEROL-FED RABBIT (Abstract
Available)

Author(s): WARREN RJ; EBERT DL; BARTER PJ; MITCHELL A

Corporate Source: BAKER MED RES INST, COMMERCIAL RD/PRAHRAN/VIC
3181/AUSTRALIA/; UNIV WOLLONGONG/WOLLONGONG/NSW 2500/AUSTRALIA/

Journal: BIOCHIMICA ET BIOPHYSICA ACTA, 1991, V1086, N3, P354-358

Language: ENGLISH Document Type: ARTICLE

Abstract: Hepatic lipase (HL) and cholesteryl ester transfer protein (CETP) activities are both increased in the rabbit by cholesterol feeding. The in vivo regulation of HL and CETP were explored by examining changes in specific steady-state mRNA levels upon cholesterol feeding. On feeding rabbits cholesterol, HL activity increased 3-fold after 2 days and remained at 2.6-times the control value at 28 days. Specific rabbit HL mRNA levels were assessed by dot blot analysis of liver poly (A) + RNA hybridized with the human HL cDNA. No significant changes in liver HL mRNA accompanied the increase in activity seen at days 2 and 7. At day 28 a modest rise of 46% was observed. A significant rise in CETP activity, evident 7 days after the commencement of cholesterol feeding, was maintained until day 28 when it was 2.4-times the control value. Using the human CETP cDNA as probe, rabbit liver CETP mRNA was also found to increase by day 7, rising to 3.7-times control by day 28. The strong temporal relationship between the rise in CETP activity and mRNA ($r = 0.55$, $P = 0.02$) suggests that the regulation of CETP may be primarily effected by the levels of specific mRNA. In contrast, the discordance between levels of lipase activity and mRNA suggests that post-transcriptional events may be more important in the regulation of HL in the cholesterol fed rabbit.

Title: THE REGULATION OF HEPATIC LIPASE AND CHOLESTERYL ESTER TRANSFER PROTEIN-ACTIVITY IN THE CHOLESTEROL-FED RABBIT
, 1991

Abstract: Hepatic lipase (HL) and cholesteryl ester transfer protein (CETP) activities are both increased in the rabbit by cholesterol feeding. The in vivo regulation of HL and CETP were explored by examining changes in specific steady-state mRNA levels upon cholesterol feeding. On feeding rabbits cholesterol, HL activity increased 3-fold after 2 days and remained at 2.6-times the control value at 28 days. Specific rabbit HL mRNA levels were assessed by dot blot analysis of liver poly (A) + RNA hybridized...

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...transcriptional events may be more important in the regulation of HL in the cholesterol fed rabbit.

Research Fronts: 89-1447 001 (DEVELOPMENTALLY REGULATED GENE; CAPPING PROTEIN; CDNA SEQUENCE; GENOME ORGANIZATION)

24/3,K,AB/5 (Item 3 from file: 34)
DIALOG(R)File 34:SciSearch(R) Cited Ref Sci
(c) 2003 Inst for Sci Info. All rts. reserv.

01337586 Genuine Article#: GQ630 Number of References: 46

Title: MOLECULAR-CLONING, SEQUENCE, AND EXPRESSION OF CYNOMOLGUS MONKEY CHOLESTERYL ESTER TRANSFER PROTEIN - INVERSE CORRELATION BETWEEN HEPATIC CHOLESTERYL ESTER TRANSFER PROTEIN MESSENGER-RNA LEVELS AND PLASMA HIGH-DENSITY-LIPOPROTEIN LEVELS (Abstract Available)

Author(s): PAPE ME; REHBERG EF; MAROTTI KR; MELCHIOR GW

Corporate Source: UPJOHN CO,METAB DIS RES,7250-209-4/KALAMAZOO//MI/49001; UPJOHN CO,MOLEC BIOL RES/KALAMAZOO//MI/49001

Journal: ARTERIOSCLEROSIS AND THROMBOSIS, 1991, V11, N6, P1759-1771

Language: ENGLISH Document Type: ARTICLE

Abstract: A cDNA clone containing the coding region for cynomolgus monkey cholesteryl ester transfer protein (**CETP**) was isolated by the polymerase chain reaction with primers based on the human **CETP** cDNA sequence and cDNA synthesized from liver poly (A+) RNA. Analysis of that cDNA indicated that the nucleotide and amino acid sequences of cynomolgus monkey **CETP** were greater than 95% homologous with the human sequences. A fragment of the cDNA was used to develop an internal-standard/RNase protection assay that allowed precise quantification of **CETP** mRNA levels. Analysis of total RNA from various tissues with this assay revealed that the liver and thoracic aorta expressed high levels of **CETP** mRNA; the mesenteric fat, adrenal gland, spleen, and abdominal aorta had low but detectable levels of the mRNA; and the brain, kidney, intestine, and skeletal muscle had undetectable levels of that mRNA. When the monkeys were made hypercholesterolemic by a high-fat, high-cholesterol (HFHC) diet, hepatic levels of **CETP** mRNA increased from 1.6 +/- 0.4 pg/mu-g total RNA (mean +/- SEM) to 4.1 +/- 0.8 pg/mu-g ($p < 0.005$); mesenteric fat **CETP** mRNA increased from 0.4 +/- 0.1 pg/mu-g total RNA to 5.3 +/- 2.2 pg/mu-g ($p < 0.05$); and plasma CET activity increased approximately fourfold. The **CETP** mRNA levels in the thoracic and abdominal aortas were not significantly increased in monkeys fed the HFHC diet, even though those animals had gross atherosclerosis. The apoprotein E mRNA levels, however, were markedly increased in the aortas of monkeys with atherosclerosis, with the largest increase occurring in the abdominal aorta. Taken together, these data suggest that lipid deposition in the artery was not accompanied by increased expression of the **CETP** gene in that tissue. Statistical analysis showed that a strong, negative correlation existed between hepatic **CETP** mRNA levels and both high density lipoprotein cholesterol ($r = -0.85$, $p < 0.001$) and apoprotein A-I ($r = -0.84$, $p < 0.001$). These data suggest that HFHC diet-induced changes in high density lipoprotein metabolism may be linked to altered expression of a functional **CETP** gene.

, 1991

Abstract: A cDNA clone containing the coding region for cynomolgus monkey cholesteryl ester transfer protein (**CETP**) was isolated by the polymerase chain reaction with primers based on the human **CETP** cDNA sequence and cDNA synthesized from liver poly (A+) RNA. Analysis of that cDNA indicated that the nucleotide and amino acid sequences of cynomolgus monkey **CETP** were greater than 95% homologous with the human sequences. A fragment of the cDNA was used to develop an internal-standard/RNase protection assay that allowed precise quantification of **CETP** mRNA levels. Analysis of total RNA from various tissues with this assay revealed that the liver and thoracic aorta expressed high levels of **CETP** mRNA; the mesenteric fat, adrenal gland, spleen, and abdominal aorta had low but detectable levels...

...monkeys were made hypercholesterolemic by a high-fat, high-cholesterol (HFHC) diet, hepatic levels of **CETP** mRNA increased from 1.6 +/- 0.4 pg/mu-g total RNA (mean +/- SEM) to 4.1 +/- 0.8 pg/mu-g ($p < 0.005$); mesenteric fat **CETP** mRNA increased from 0.4 +/- 0.1 pg/mu-g total RNA to 5.3...
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 ...gene in that tissue. Statistical analysis showed that a strong, negative correlation existed between hepatic **CETP** mRNA levels and both high density lipoprotein cholesterol ($r = -0.85$, $p < 0.001$) and...
 ...changes in high density lipoprotein metabolism may be linked to altered expression of a functional **CETP** gene.

...Identifiers--LIPID TRANSFER PROTEINS; A-I METABOLISM; ATHEROGENIC DIET;
APOLIPOPROTEIN-E; **RABBIT**; ATHEROSCLEROSIS; TISSUE; LIVER; DOGS;
DNA

Research Fronts: 89-1447 002 (DEVELOPMENTALLY REGULATED **GENE**;
CAPPING PROTEIN; **CDNA SEQUENCE**; GENOME ORGANIZATION)
89-2539 001 (LOW-DENSITY LIPOPROTEIN METABOLISM; LDL RECEPTOR; RAT
AORTIC SMOOTH-MUSCLE...

?

IALOG(R)File 155:MEDLINE(R)

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08345226 95033197 PMID: 7946324

An efficient expression, purification and immunodetection system for recombinant gene products.

Baier G; Baier-Bitterlich G; Couture C; Telford D; Giampa L; Altman A

La Jolla Institute for Allergy and Immunology, CA.

BioTechniques (UNITED STATES) Jul 1994, 17 (1) p94, 96, 98-9,

ISSN 0736-6205 Journal Code: 8306785

Contract/Grant No.: CA35299; CA; NCI

Document type: Technical Report

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

We describe a modification of the mammalian expression vector pRc/CMV, which drives expression of inserted genes from either the human cytomegalovirus (CMV) immediate-early promoter or the bacteriophage T7 RNA polymerase promoter. The modification is designed to allow expression, simple purification and specific immunodetection of recombinant fusion proteins. The modified plasmid, termed pTag/CMV-neo, encodes a Kozak consensus ribosome-binding site (RBS) and a 30-amino acid fusion tag peptide. This peptide consists of a metal ion-binding site, (His)₆, for single-step affinity purification using Ni(2+)-chelating resin and a multi-purpose HIV-1-derived peptide (p18HIV). This viral epitope can be used to identify, detect and characterize target fusion proteins in conjunction with a specific monoclonal antibody H902 that does not display cross-reactivity with cellular proteins. The H902 production hybridoma cell line is reagent #521 from the NIH AIDS Research and Reference Program.

Jul 1994,

... expression vector pRc/CMV, which drives e

299221 94365494 PMID: 8083602

The HIV-1 regulatory protein Nef has a specific function in viral expression in a murine macrophage cell line.

Murphy K M; Sweet M J; Hume D A

Centre for Molecular Biology and Biotechnology, University of Queensland, Australia.

Journal of leukocyte biology (UNITED STATES) Sep 1994, 56 (3)

p294-303, ISSN 0741-5400 Journal Code: 8405628

Document type: Journal Article

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

Expression of reporter genes under the control of the HIV-1 long terminal repeat (LTR) was up-regulated in the murine macrophage cell line RAW264 by cotransfection of a **plasmid** coding for the viral regulatory protein Nef. To determine if a discrete section of the LTR was exclusively responsive to Nef, a series of promoters was produced by successive 5' deletions from the LTR up to the boundary of the enhancer region. These truncated promoters were as active as the full-length sequence in the RAW264 cells, but elimination of the direct repeats and one of the three Sp1 sites reduced promoter activity to minimal levels. Transcription driven by all constructs was equally susceptible to the trans-activating effect of Nef and could be increased further by the addition of a Tat-expressing **plasmid** to the cotransfection. Open reading frames of nef from NL4-3, from HXB2, which has a premature stop, and a fully functional hybrid of the two under the control of the SR alpha artificial promoter (SV40 early promoter plus HTLV-I R-U5') were able to transactivate the LTR in RAW264 cells to the same degree as HXB3 nef under the control of the cytomegalovirus (CMV) immediate-early **promoter**. A frameshift mutation of Nef at the XhoI site at position 8475 did not abrogate trans-activation of the LTR in macrophages. To further define the effective trans-activation region of Nef, internal deletions were made. Changes downstream of the XhoI site at amino acid 35 resulted in little or no reduction in trans-activation, whereas a deletion between the **CMV promoter** of the expression **plasmid** and the XhoI site largely abolished activity. Nef trans-activation of the LTR may be restricted to macrophages. Parallel cotransfection experiments in COS-1 simian fibroblast-like cells showed repression of reporter expression by Nef. Results suggested that the section of nef responsible for transactivation of the LTR in macrophages differed slightly from that sufficient for trans-repression in fibroblasts. Translation of the protein from the first translation start site (Met-1) rather than from the second in-frame ATG (Met-20) appears to be necessary for the trans-activating effect of Nef in RAW264 cells. Mutation of the initial ATG to ATA led to loss of trans-activating activity. Expression of Nef also has a cytostatic/cytotoxic effect on RAW264 cells indicated by a reduced rate of establishment of stably transfected clones. The cytostatic effect of Nef was not relieved by internal deletions in the coding sequence. (ABSTRACT TRUNCATED AT 400 WORDS)

Sep 1994,

... LTR) was up-regulated in the murine macrophage cell line RAW264 by cotransfection of a **plasmid** coding for the viral regulatory protein Nef. To determine if a discrete section of the...

... effect of Nef and could be increased further by the addition of a Tat-expressing **plasmid** to the cotransfection. Open reading frames of nef from NL4-3, from HXB2, which has...

... RAW264 cells to the same degree as HXB3 nef under the control of the cytomegalovirus (CMV) immediate-early **promoter**. A frameshift mutation of Nef at the XhoI site at position 8475 did not abrogate...

... 35 resulted in little or no reduction in trans-activation, whereas a

deletion between the CMV promoter of the expression
plasmid and the XhoI site largely abolished activity. Nef
trans-activation of the LTR may be...

16/3,K,AB/9 (Item 9 from file: 155)
DIALOG(R)File 155:MEDLINE(R)

05375476 87053814 PMID: 3536478

Tetanus toxin: primary structure, expression in E. coli, and homology with botulinum toxins.

Eisel U; Jarausch W; Goretzki K; Henschen A; Engels J; Weller U; Hudel M; Habermann E; Niemann H

EMBO journal (ENGLAND) Oct 1986, 5 (10) p2495-502, ISSN

0261-4189 Journal Code: 8208664

Document type: Journal Article

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

A pool of synthetic oligonucleotides was used to identify the gene encoding tetanus toxin on a 75-kbp plasmid from a toxigenic non-sporulating strain of Clostridium tetani. The nucleotide sequence contained a single open reading frame coding for 1315 amino acids corresponding to a polypeptide with a mol. wt of 150,700. In the mature toxin molecule, proline (2) and serine (458) formed the N termini of the 52,288 mol. wt light chain and the 98,300 mol. wt heavy chain, respectively. Cysteine (467) was involved in the disulfide linkage between the two subchains. The amino acid sequences of the tetanus toxin revealed striking homologies with the partial amino acid sequences of botulinum toxins A, B, and E, indicating that the neurotoxins from C. tetani and C. botulinum are derived from a common ancestral gene. Overlapping peptides together covering the entire tetanus toxin molecule were synthesized in Escherichia coli and identified by monoclonal antibodies. The promoter of the toxin gene was localized in a region extending 322 bp upstream from the ATG codon and was shown to be functional in E. coli.

Oct 1986,

11/3,K,AB/5 (Item 5 from file: 155)
DIALOG(R)File 155:MEDLINE(R)
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07945496 94011029 PMID: 8406568

Analysis of human T-cell receptor V beta gene usage following immunization to tetanus toxoid in vivo.

Hibberd M L; Wong F S; Nicholson L B; Demaine A G

Department of Medicine, King's College School of Medicine and Dentistry, London.

Immunology (ENGLAND) Jul 1993, 79 (3) p398-402, ISSN 0019-2805 Journal Code: 0374672

Document type: Journal Article

Languages: ENGLISH

Main Citation Owner: NLM

Record type: Completed

The human T-cell antigen receptor (TcR) V beta repertoire was investigated following in vivo reimmunization with tetanus toxoid (TT). Four healthy subjects were immunized subcutaneously with TT, and 24 samples of peripheral blood T cells were taken at intervals over several weeks and used to generate TcR-C beta chain-specific first-strand cDNA. A semi-quantitative assay utilizing the polymerase chain reaction (PCR) was used to measure the amount of 22 different TcR-V beta gene transcripts in the cDNA. A peak increase in the amount of V beta 2, 4, 6, 13.1 and 14 occurred 14 days post-immunization, with each V beta increased in at least two of the four subjects. No obvious changes in the other 17 V beta genes were found. A secondary antibody response to TT occurred in all subjects by day 14. These results show that it is now possible to characterize the in vivo kinetics of the human TcR repertoire following stimulation with a conventional antigen.

? ds

Set	Items	Description
S1	0	TETANUS (5N) TOXOID (5N) CDNA
S2	14825	TETANUS (5N) (TOXIN OR TOXOID)
S3	347525	CDNA
S4	96	S2 AND S3
S5	63	S4 AND PY<1996
S6	50	RD (unique items)
S7	129	TETANUS (5N) (CDNA OR GENE)
S8	80	RD (unique items)
S9	33	S8 AND PY<1996
S10	1839226	SEQUENC?
S11	24	S9 AND S10

? s cmv (5n) promoter

29753 CMV

304756 PROMOTER

S12 2872 CMV (5N) PROMOTER

? s plasmid

S13 157100 PLASMID

? s s12 and s13

2872 S12

157100 S13

S14 685 S12 AND S13

? s s14 and py<1996

Processing

685 S14

27414523 PY<1996

S15 52 S14 AND PY<1996

? rd

>>>Duplicate detection is not supported for File 340.

>>>Records from unsupported files will be retained in the RD set.

...examined 50 records (50)

...completed examining records

S16 23 RD (unique items)

? s cmv(5n)promoter
655 CMV
16805 PROMOTER
S1 284 CMV(5N)PROMOTER
? s s1 and py<1997
284 S1
2818514 PY<1997
S2 20 S1 AND PY<1997
? t s2/3,k,ab/1-5

2/3,K,AB/1
DIALOG(R)File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog Acc No: 3775852 IFI Acc No: 0239422
Document Type: C
ENDOMETRIAL FUNCTION
Inventors: Charnock-Jones David Stephen (GB); Heap Robert Brian (GB);
Sharkey Andrew Mark (GB); Smith Stephen Kevin (GB)
Assignee: Cambridge University Technical Services Ltd GB
Assignee Code: 47628
Publication (No,Date), Applic (No,Date):
US 6472374 20021029 US 97860047 19970918
Publication Kind: B
Calculated Expiration: 20151221
PCT Pub(No,Date),Applic(No,Date): WO 9620013 19960704 WO
95GB3008 19951221
Section 371: 19970918
Section 102(e):19970918
Priority Applic(No,Date): GB 9426380 19941224; GB 9520879 19951012

Abstract: Disclosed is a method of altering one or more characteristics of
at least some of the cells of the reproductive tract of a mammalian
individual by the introduction into said cells of a nucleic acid, together
with a composition comprising nucleic acid, for use in the method.

...PCT Pub(No,Date),Applic(No,Date): 19960704
Non-exemplary Claims: ...7. The method of claim 1, wherein the
promoter is the **CMV promoter**.
...

...9. The method of claim 8, wherein the **promoter** is the **CMV**
promoter.

2/3,K,AB/2
DIALOG(R)File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog Acc No: 3707410 IFI Acc No: 0221264
Document Type: C
GENE THERAPY FOR RESTENOSIS USING AN ADENOVIRAL VECTOR; TREATMENT OF
RESTENOSIS BY GENE THERAPY, COMPRISING THE ADMINISTRATION OF A RECOMBINANT
ADENOVIRUS CONTAINING A SUICIDE GENE
Inventors: Branellec Didier (FR); Dedieu Jean-Francois (FR); Deneffe
Patrice (FR); Feldman Laurent (FR); Perricaudet Michel (FR); Steg
Philippe Gabriel (FR)
Assignee: Aventis Pharma S A FR
Assignee Code: 53500
Publication (No,Date), Applic (No,Date):
US 6410011 20020625 US 96633769 19960620
Publication Kind: B

Calculated Expiration: 20150810
PCT Pub(No,Date),Applic(No,Date): WO 965321 19960222 WO
95FR1074 19950810
Section 371: 19960620
Section 102(e):19960620
Priority Applic(No,Date): FR 9410083 19940817

Abstract: A method for treating restenosis by gene therapy is disclosed, said method comprising delivering a recombinant suicide-genecontaining adenovirus.

...PCT Pub(No,Date),Applic(No,Date): 19960222
Non-exemplary Claims: ...wherein the promoter is selected from the group consisting of a RSV LTR and a **CMV promoter**.

2/3,K,AB/3
DIALOG(R)File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog_Acc No: 3678809 IFI_Acc No: 0214446
Document Type: C
CELL-SPECIFIC ACTIVE COMPOUNDS REGULATED BY THE CELL CYCLE; DNA CONSTRUCT OF AN ACTIVATOR SEQUENCE, A CELL CYCLE-CONTROLLED PROMOTER, AND DNA WHICH CODES FOR AN ACTIVE SUBSTANCE; GENE THERAPY
Inventors: Muller Rolf (DE); Sedlacek Hans-Harald (DE)
Assignee: Hoechst AG DE
Assignee Code: 29472
Publication (No,Date), Applic (No,Date):
US 6384202 20020507 US 97793109 19970425
Publication Kind: B
Calculated Expiration: 20150825
PCT Pub(No,Date),Applic(No,Date): WO 966941 19960307 WO
95EP3371 19950825
Section 371: 19970425
Section 102(e):19970425
Priority Applic(No,Date): GB 9417366 19940826; GB 956466 19950329;
DE 19524720 19950712

Abstract: A DNA sequence is described for the gene therapy of diseases associated with the immune system. In its essential elements, the DNA sequence is composed of an activator sequence, a promoter module and a gene for the active substance. The activator sequence is activated in a cell-specific or virus-specific manner and this activation is regulated by the promoter module in a cell cycle-specific manner. The choice of activator sequence and active substance depends on the indication area. The DNA sequence is inserted into a viral or non-viral vector which is supplemented by a ligand having affinity for the target cell. Depending on the choice of activator sequence and active substance, the following can be treated by administering the DNA sequence: defective formation of blood cells; autoimmune diseases and allergies and, in addition, rejection reactions against transplanted organs; chronic arthritis; viral and parasitic infections and, in addition, prophylaxis of viral, bacterial and parasitic infections; and leukemias.

...PCT Pub(No,Date),Applic(No,Date): 19960307
Non-exemplary Claims: ...4. The active compound as claimed in claim 3, containing the **CMV promoter** sequence, the **CMV enhancer** sequence or the **SV40 promoter** sequence...

2/3,K,AB/4

DIALOG(R) File 340:CLAIMS(R)/US Patent
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Dialog Acc No: 3650798 IFI Acc No: 0206935
Document Type: C
DNA FOR EXPRESSION UNDER CONTROL OF A CELL CYCLE-DEPENDENT PROMOTER;
NUCLEOTIDE SEQUENCES PREFERENTIAL POLYPEPTIDES FOR USE IN THE TREATMENT OF
DEFECTS IN CENTRAL NERVOUS SYSTEM
Inventors: Muller Rolf (DE); Sedlacek Hans-Harald (DE)
Assignee: Aventis Pharma Deutschland GmbH DE
Assignee Code: 52914
Publication (No,Date), Applic (No,Date):
US 6358732 20020319 US 97793110 19970425
Publication Kind: B
Calculated Expiration: 20150825
PCT Pub(No,Date),Applic(No,Date): WO 966939 19960307 WO
95EP3369 19950825
Section 371: 19970425
Section 102(e):19970425
Priority Applic(No,Date): GB 9417366 19940826; GB 956466 19950329

Abstract: A DNA sequence is disclosed for the genetic therapy of diseases of the central nervous system. The essential components for the DNA sequence are the activator sequence, the promoter module, and the active substance coding gene. The activator sequence is specifically activated in activated endothelial or glial cells. Activation is cell cycle-regulated by the promoter module. The active substance represents an inhibitor of the nerve growth factor, a dopamine metabolism enzyme, and/or a nerve cell protection factor. The disclosed DNA sequence is inserted into a viral or non-viral vector, supplemented with a ligand with affinity for the target cells.

...PCT Pub(No,Date),Applic(No,Date): 19960307
Non-exemplary Claims: ...of claim 1, wherein said activator sequence is selected from the group consisting of: a CMV promoter, a CMV enhancer and a SV40 promoter.

2/3,K,AB/5
DIALOG(R) File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog Acc No: 3600051 IFI Acc No: 0141864
Document Type: C
VIABLE CONTAMINANT PARTICLE FREE ADENOVIRUSES, THEIR PREPARATION AND USE;
GENETICALLY ENGINEERED REPLICATION DEFECTIVE VIRAL VECTOR FOR USE AS A TOOL
IN GENE THERAPY
Inventors: Orsini Cecile (FR); Perricaudet Michel (FR); Yeh Patrice (FR)
Assignee: Rhone-Poulenc Rorer S A FR
Assignee Code: 27977
Publication (No,Date), Applic (No,Date):
US 6312946 20011106 US 97817575 19970422
Publication Kind: B
Calculated Expiration: 20151025
PCT Pub(No,Date),Applic(No,Date): WO 9613596 19960509 WO
95FR1415 19951025
Section 371: 19970422
Section 102(e):19970422
Priority Applic(No,Date): FR 9413355 19941028

Abstract: Novel adenovirus-derived viral vectors, the preparation thereof, and their use in gene therapy, are disclosed. In particular, recombinant adenoviruses including an adenovirus genome wherein (i) the E1 region is

inactivated, (ii) the genomic organization is modified, and (iii) optional recombination with the producing line genome generates non-viable viral particles, are disclosed.

...PCT Pub(No,Date),Applic(No,Date): 19960509

Non-exemplary Claims: ...the viral promoter is selected from the group consisting of an E1A, an MLP, a CMV, and an RSV promoter.

?

s rabbit(5n) CETP
1066 RABBIT
89 CETP
S3 3 RABBIT(5N) CETP

? rd

>>>Duplicate detection is not supported for File 340.
>>>All specified files are unsupported, command ignored.
? t s3/3,k,ab/1-3

3/3,K,AB/1
DIALOG(R)File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog Acc No: 10356103 IFI Acc No: 2003-0100520 IFI Acc No: 2003-0028341
Document Type: C
IMMUNOLOGICAL PROCESS AND CONSTRUCTS FOR INCREASING THE HDL CHOLESTEROL
CONCENTRATION BY DNA VACCINATION
Inventors: GLENN KEVIN (US); NEEDLEMAN PHILIP (US)
Assignee: Unassigned Or Assigned To Individual
Assignee Code: 68000
Publication (No,Date), Applic (No,Date):
US 20030100520 20030529 US 99386591 19990831
Publication Kind: A1
Continuation Pub(No),Applic(No,Date): US 97934367
19970919
Cont.-in-part Pub(No),Applic(No,Date): US
97785997 19970121; US 97788882 19970121
Priority Applic(No,Date): US 99386591 19990831; US 97934367 19970919;
US 97785997 19970121; US 97788882 19970121

Abstract: A process for inducing the production of antibodies that bind to
cholesteryl ester transfer protein (CETP) is disclosed. That process
comprises the steps of: (a) immunizing a mammal with an inoculum containing
a recombinant DNA molecule that comprises a DNA sequence that contains (i)
a sequence encoding a CETP immunogen that is linked to (ii) a promoter
sequence that controls expression of the CETP immunogen, the recombinant
DNA molecule being dissolved or dispersed in a vehicle; and (b) maintaining
the immunized mammal for a time period sufficient to induce the production
of antibodies that bind to CETP, and preferably lessen the transfer of
cholesteryl esters from HDL where the blood of the mammal itself contains
CETP. Immunogens, inocula, DNA segments, and recombinant DNA molecule
vectors useful for carrying out the invention are also disclosed.

Non-exemplary Claims: ...7. The process according to claim 3 wherein said
recombinant DNA molecule encodes rabbit CETP as said
immunogenic polypeptide...

3/3,K,AB/2
DIALOG(R)File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog Acc No: 10277401 IFI Acc No: 2003-0021804 IFI Acc No: 2003-0005236
Document Type: C
IMMUNOLOGICAL PROCESS FOR INCREASING THE HDL CHOLESTROL CONCENTRATION
Inventors: GLENN KEVIN (US); NEEDLEMAN PHILIP (US)
Assignee: Unassigned Or Assigned To Individual
Assignee Code: 68000
Publication (No,Date), Applic (No,Date):
US 20030021804 20030130 US 97785997 19970121
Publication Kind: A1
Priority Applic(No,Date): US 97785997 19970121

Abstract: A process for increasing the concentration of HDL cholesterol in the blood of a mammal whose blood contains cholesterol ester transfer protein (CETP) is contemplated. That process comprises the steps of: (a) immunizing the mammal with an inoculum containing a CETP immunogen that is an immunogenic polypeptide having a CETP amino acid residue sequence and is dissolved or dispersed in a vehicle; and (b) maintaining the immunized mammal for a time period sufficient for said immunogenic polypeptide to induce the production of antibodies that bind to CETP and lessen the transfer of cholesteryl esters from HDL. Immunogens, inocula and DNA segments useful for carrying out the invention are also disclosed.

Non-exemplary Claims: ...according to claim 1 wherein said immunogenic polypeptide has the amino acid residue sequence of **rabbit CETP**.

3/3,K,AB/3
DIALOG(R) File 340:CLAIMS(R)/US Patent
(c) 2003 IFI/CLAIMS(R). All rts. reserv.

Dialog Acc No: 3707419 IFI Acc No: 0221273
Document Type: C
MONOCLONAL ANTIBODY REACTIVE TO HUMAN CETP AND ASSAY METHOD FOR HUMAN CETP;
ANTI-HUMAN CHOLESTERYL ESTER TRANSFER PROTEIN MONOCLONAL ANTIBODY OR FAB
FRAGMENT WHICH INHIBITS CHOLESTEROL ESTER TRANSFER ACTIVITY OF HUMAN CETP
AND DOES NOT INHIBIT ACTIVITY OF **RABBIT CETP**
Inventors: Kamada Masafumi (JP); Okamoto Hiroshi (JP); Tamatani Takuya (JP)
Assignee: Japan Tobacco Inc JP
Assignee Code: 43797
Publication (No,Date), Applic (No,Date):
US 6410020 20020625 US 2000615404 20000712
Publication Kind: B
Calculated Expiration: 20200712
Priority Applic(No,Date): JP 95134836 19950502

Abstract: Monoclonal antibodies which have binding specificity to human CETP(CETP inhibition activity) and which are useful as reagents for purification or quantification of human CETP, and as pharmaceuticals to prevent and/or treat hyperlipidemia or arteriosclerosis are provided. Furthermore, purification and quantification methods of human CETP by using the monoclonal antibodies are also provided.

...WHICH INHIBITS CHOLESTEROL ESTER TRANSFER ACTIVITY OF HUMAN CETP AND DOES NOT INHIBIT ACTIVITY OF **RABBIT CETP**

Exemplary Claim: ...ester transfer activity of human CETP and does not inhibit cholesterol ester transfer activity of **rabbit CETP** at a concentration of 3 μ g/ml or below, and wherein said monoclonal antibody...

?

4/3,K,AB/5 (Item 5 from file: 34)
DIALOG(R)File 34:SciSearch(R) Cited Ref Sci
(c) 2000 Inst for Sci Info. All rts. reserv.

03950134 Genuine Article#: QU741 Number of References: 33

Title: FUSIONAL EXPRESSION OF HUMAN **CHOLESTERYL ESTER**

TRANSFER PROTEIN CDNA IN RECOMBINANT VACCINIA

VIRUS-INFECTED MAMMALIAN-CELLS

Author(s): YOON WH; JANG MK; BOK SH; PARK KB

Corporate Source: KYUNGPOOK NATL UNIV, COLL NAT SCI, DEPT GENET ENGN/TAEGU

702701//SOUTH KOREA/; KYUNGPOOK NATL UNIV, COLL NAT SCI, DEPT GENET

ENGN/TAEGU 702701//SOUTH KOREA/; KOREA RES INST BIOSCI &

BIOTECHNOL, BIOPROD RES GRP/TAJEON 305606//SOUTH KOREA/

Journal: MOLECULES AND CELLS, 1995, V5, N2 (APR 30), P107-113

ISSN: 1016-8478

Language: ENGLISH Document Type: ARTICLE

Abstract: Biologically active human plasma **cholesteryl ester**

transfer protein (CETP) was directed to produce as a

fusion protein with **glutathione-S-transferase (GST)** in

recombinant vaccinia virus-infected mammalian cells, Complementary DNAs

for CST and **CETP** were ligated side by side, and introduced into

vaccinia viral transfer vectors. The viral vectors were transfected

into CV-1 cells infected previously with wild-type vaccinia viruses,

Recombinant viruses were generated by the homologous recombination and

selected with BUdR and X-gal in human TK- 143B cells. The DNA from the

selected virus was amplified and expressed in the CV-1 cells, The

GST/CETP fusion protein (86 kDa) was identified on the

SDS-PAGE followed by Western blot analysis using polyclonal antibody

against the C-terminal active region of **CETP** fused with **GST**

, The virus-infected cell lysates were loaded on the **glutathione**

-Sepharose affinity column and the **CETP** was eluted from the

column by cleavage with thrombin while the **GST/CETP** was

bound on the column, The purified **CETP** showed biological activity

when subjected to a **CETP** assay.

Title: FUSIONAL EXPRESSION OF HUMAN **CHOLESTERYL ESTER**

TRANSFER PROTEIN CDNA IN RECOMBINANT VACCINIA

VIRUS-INFECTED MAMMALIAN-CELLS

9/3,K,AB/3 (Item 3 from file: 155)
DIALOG(R)File 155:MEDLINE(R)
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09033505 96417308

Structure-function relationships of human **cholesteryl ester transfer protein**: analysis using monoclonal **antibodies**.

Roy P; MacKenzie R; Hiram T; Jiang XC; Kussie P; Tall A; Rassart E; Milne R

Departement des Sciences Biologiques, Universite du Quebec a Montreal, Canada.

Journal of lipid research (UNITED STATES) Jan 1996, 37 (1) p22-34,
ISSN 0022-2275 Journal Code: IX3

Languages: ENGLISH

Document type: JOURNAL ARTICLE

Cholesteryl ester transfer protein (CETP), a 476 amino acid glycoprotein, mediates cholesteryl ester (CE), triglyceride, and phospholipid transfer among plasma lipoproteins. A monoclonal **antibody** (mAb), TP2, specific for an epitope within the last 26 amino acids of **CETP** has been shown to block all **CETP**-mediated lipid transfer, apparently by limiting access to lipid-binding sites in the carboxy terminal of **CETP**. A new panel of 16 anti-human **CETP** mAbs has now been used to further probe the structure-function relationships of **CETP**. Of the new mAbs, 9 partially inhibit **CETP**-mediated CE transfer (24-43%) from HDL to LDL. The corresponding epitopes were mapped within the **CETP** primary structure by the reactivity of the mAbs with **CETP** variants having deletions or amino acid substitutions. Of the 9 new, neutralizing mAbs, 6 are specific for epitopes situated between residues 410-450 and two others for epitopes between residues 184-260 and 332-366, respectively. The epitope of one neutralizing mAbs could not be mapped. Therefore, binding of mAbs to epitopes situated in four non-overlapping regions within **CETP** primary structure that are separated by as many as 280 residues can neutralize **CETP**-mediated CE transfer. Epitopes of mAbs that do not influence CE transfer activity map to the regions 184-260, 261-331, and 367-409, respectively. When pairs of mAbs were tested for their abilities to mutually compete for binding to immobilized **CETP**, competition was observed for mAbs specific for epitopes that are distant in **CETP** primary structure. The cross-competition patterns demonstrate that the carboxy terminal 60% of **CETP** adopts a compact structure. Together with previous mutagenesis studies, the data suggests that a carboxy terminal neutral lipid binding domain may be in close proximity to a lipoprotein binding region within native **CETP**.

Structure-function relationships of human **cholesteryl ester**

Dialog Acc No: 2864290 IFI Acc No: 9719947
Document Type: C
TIGHT CONTROL OF GENE EXPRESSION IN EUKARYOTIC CELLS BY
TETRACYCLINE-RESPONSIVE PROMOTERS
Inventors: Bujard Hermann (DE); Gossen Manfred (DE); Salfeld Jochen G (US);
Voss Jeffrey W (US)
Assignee: BASF AG DE; Knoll AG DE Assignee Code: 04911 07016
Patent (No,Date), Applic (No,Date)
US 5650298 19970722 US 94260452 19940614
Calculated Expiration: 20140722
(Cited in 001 later patents)
Cont.-in-part Pat(No),Applic(No,Date): ABANDONED US 9376327
19930614
Priority Applic(No,Date): US 94260452 19940614; US 9376327 19930614

Abstract:

Transgenic animals carrying two transgenes, the first coding for a transactivator fusion protein comprising a tet repressor and a polypeptide which directly or indirectly activates in eucaryotic cells, and the second comprising a gene operably linked to a minimal **promoter** operably linked to at least one tet operator sequence, are disclosed. Isolated DNA molecules (e.g., targeting vectors) for integrating a polynucleotide sequence encoding a transactivator of the invention at a predetermined location within a second target DNA molecule by homologous recombination are also disclosed. Transgenic animals having the DNA molecules of the invention integrated at a predetermined location in a chromosome by homologous recombination are also encompassed by the invention. Methods to regulate the expression of a tet operator linked-gene of interest by administering tetracycline or a tetracycline analogue to an animal of the invention are also disclosed. The regulatory system of the invention allows for conditional inactivation or modulation of expression of a gene of interest in a host cell or animal.

Patent (No,Date), Applic (No,Date)
... 19970722

Abstract:

...activates in eucaryotic cells, and the second comprising a gene operably linked to a minimal **promoter** operably linked to at least one tet operator sequence, are disclosed. Isolated DNA molecules (e...

Non-exemplary Claims:

- ...for integrating a polynucleotide sequence encoding a tetracycline-controllable transactivator (tTA) and a tTA-responsive **promoter** within a predetermined gene of interest in a second target DNA molecule, the DNA molecule...
- ...activates transcription in eucaryotic cells; and c) a third polynucleotide sequence comprising a tTA-responsive **promoter**, operably linked to: d) a fourth polynucleotide sequence comprising at least a portion of a...
- ...of interest and expression of the gene of interest is controlled by the tTA-responsive **promoter**.
- ...21. The DNA molecule of claim 11, wherein the tTA-responsive **promoter** of the third nucleotide sequence comprises a minimal **promoter** operably linked to at least one tet operator sequence...
- ...22. The DNA molecule of claim 21, wherein the minimal **promoter** is

derived from a **cytomegalovirus immediate early gene promoter** or a herpes simplex virus thymidine kinase gene **promoter**.

...claim 25, further comprising a gene of interest operably linked to a tTA-responsive transcriptional **promoter**.

...

...27. The host cell of claim 26, wherein the tTA-responsive **promoter** comprises a minimal **promoter** operably linked to at least one tet operator sequence...

...28. The host cell of claim 27, wherein the minimal **promoter** is derived from a **cytomegalovirus immediate early gene promoter** or a herpes simplex virus thymidine kinase gene **promoter**.

...

...method for inhibiting transcription of the gene of interest operatively linked to the tTA-responsive **promoter** in the host cell of claim 26, comprising contacting the cell with tetracycline or a...gene product encoded by the gene of interest operably linked to the tTA-responsive transcriptional **promoter** in the cell of claim 26, comprising: a) growing cells in a culture medium in...